10. (Twice Amended) The retarder as claimed in either of claims 1 and 2, wherein said induction winding is energized from an electrical source, which is regulated for power, of the vehicle.

In the Specification:

Please find attached a substitute specification, and a copy of the specification with markings to show where the changes have been made.

REMARKS

Claims 1-10 have been objected to as containing certain informalities. These informalities have been corrected.

This Supplemental Amendment is believed to put this application in better condition for allowance than by only entering the Amendment filed on January 20, 2003.

The Examiner asked for amendments to the drawings on page 2 of the Office Action, points (a)-(d).

(a) The frontal wall (3a) of the engine casing (3) can be seen in figures 1 and 3 and is described in the specification, but what was missing in the original drawing (figure 1) was the engine shaft or preferably crankshaft, as suggested by the Examiner, and said one end of the crankshaft which is directed toward the frontal wall (3a), with respect to point (a) as mentioned above.

(b) With respect to point (b), the stator part (4) is also represented in figures 1, 2 and 4 (stator part 4'), and it results from the specification page 4, lines 28-39 (stator description) that the stator (4) is coaxial about axis X, which is the axis of the crankshaft. Thus, again, the

crankshaft is missing in figure 1. The general disposition of the crankshaft is described in the specification in page 3, lines 23-31.

(c) With respect to point (c) as mentioned above, the description of the external component having a radial flange (11) secured to the engine shaft (crankshaft) is given in the specification in page 4, lines 9-15. This part of the specification makes clear that the rotor (2) has an external component which is formed by the envelope (10) and the end wall or flange (11) of the rotor (2), so that again, the representation of the crankshaft was missing in initial figure 1 to completely illustrate that this external component (10+11) with its radial flange (11) was secured to the engine shaft (crankshaft CS).

(d) Finally, concerning point (d) as mentioned above, the pulley (6) was shown in figure 1, but it was not quite clear that this pulley (6) was situated at the output of the engine shaft (crankshaft CS) and arranged between the casing (3) of the engine and the retarder (1). But this is now clearly represented in amended figure 1, wherein a cut-out made in the external component (10+11) of the rotor (2) makes it possible to see that the pulley (6) is arranged at the end of the crankshaft (CS) and between the casing (3), and more particularly its front wall (3a), and the retarder (1), and further that this pulley (6) is incorporated in flange (11) of the rotor (2), as this is described in the specification from page 3, line 38 to page 4, line 3 and in page 4, lines 25-27, and claimed in claim 9.

In so amending figure 1, we believe no matter is introduced, since everyone knows the shape of an engine crankshaft, which crankshaft CS is now partly shown in amended figure 1, in which we have also slightly moved the pulley 6 axially to bring it against the face of the flange 11 which is turned toward the front wall 3a of casing 3, this pulley 6 being arranged at the visible end portion of crankshaft CS, outside the front wall 3a, and which is extended inside the casing 3 by a hidden portion shown in phantom, thus showing that pulley 6 is incorporated in flange 11

and situated between the casing 3 and the retarder 1, according to the specification.

Therefore, in amending the specification, we believe you only will have to introduce the reference CS to designate the crankshaft, as all other members are already identified by numeral references.

Accordingly, since this application is believed to be in condition for allowance, a notice to that effect is earnestly solicited.

Respectfully submitted,

Stefan BOUISSOU

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Date

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Version With Markings to Show Changes Made

In the claims:

1. (Twice Amended) Eddy current electromagnetic retarder [(1)] for reducing rotation of a crankshaft of a vehicle engine [(M)] driven about an axis [(X)], said engine having a casing [(3)] wherein said casing comprises a frontal wall [(3a)] stretching substantially in a plane perpendicular to [the] said axis [(X)] of [the engine shaft] said crankshaft, said [engine] crankshaft shaft has one end directed toward [the] said frontal wall [(3a)] of [the] said casing [(3)] of [the] said engine [(M)], the retarder [(1)] being mounted overhangingly on [the] said frontal wall [(3a)] of [the] said casing [(3)] of [the] said engine [(M)] via connecting means [(19)], the retarder comprising a rotor part [(2)] which rotates coaxially with [the engine shaft] said crankshaft, a stator part [(4; 4')] coaxial with [the engine shaft] said crankshaft and secured to [the] said frontal wall [(3a)] of [the] said casing [(3)] of [the] said engine [(M)], an armature operatively attached to [the] said rotor part [(2)] and an inductor operatively attached to [the] said stator part [(4; 4')], [the] said inductor being arranged on a stationary annular component [(14, 15; 4'a, 14', 15')] of [the] said stator part [(4; 4')], facing [the] said armature, wherein [the] said rotor part [(2)] has symmetry of revolution about [the] said axis of [the engine shaft] said crankshaft so that [it] said rotor part has a peripheral face facing a peripheral face of [the] said stator part [(4; 4')], [the] said inductor of [the] said retarder having at least one electromagnetic winding [(5; 5')].

2. (Twice Amended) The retarder as claimed in claim 1, wherein [the] said rotor part [(2)] has an external component of substantially cylindrical shape which surrounds [the] said

stator part [(4)] and which constitutes [the] said armature of [the] said retarder [(1)], said external component having a radial flange [(11)] secured to [the engine shaft] said crankshaft, said flange being pierced with a number of holes [(13)].

3. (Twice Amended) The retarder as claimed in either of claims 1 and 2, wherein [the] said inductor of [the] said retarder is an inductor with poles [(16)] each surrounded by an induction winding [(5)] and projecting radially outwardly on [the] an external face of said annular component [(14, 15)] of [the] said stator part [(4)].

4. (Twice Amended) The retarder as claimed in claim 3, wherein [the] said poles [(16)] are secured to a first annulus [(14)] and the collection of induction windings constitutes a second annulus [(15)] of larger diameter than that of [the] said first annulus [(14)], said second annulus [(15)] being assembled coaxially with said first annulus [(14)] by fitting each pole [(16)] into a respective induction winding [(5)].

5. (Twice Amended) The retarder as claimed in either of claims 1 and 2, wherein [the] said inductor of [the] said retarder [(1)] is an inductor with claws [(14'b, 15'b)] and with one single induction winding [(5')].

6. (Twice Amended) The retarder as claimed in claim 5, wherein a first set of claws [(14'b)] constitutes a first annulus [(14')] and a second set of claws [(15'b)] constitutes a second annulus [(15')] with the same diameter as that of the first annulus [(14')], said induction winding [(5')] surrounding a cylindrical component [(4'a)] of a diameter smaller than that of the first and second annuli [(14', 15')], said annuli [14', 15'] being assembled coaxially with said cylindrical component [(4'a)] in such a way that each claw [(14'b)] of the first set of claws is interspersed

between two adjacent claws [(15'b)] of the second set of claws.

7. (Twice Amended) The retarder as claimed in [any] either of claims 1 [to 6] and 2, wherein [the] said connecting means comprise a framework [(19)] which has at least one substantially radial flange [(20)] centered on [the engine shaft] said crankshaft and pierced with a number of holes [(23)], said flange [(20)] having arms [(24)] extending from said flange [(20)] toward [the] said engine [(M)] to secure [the] said framework [(19)] to [the] said frontal wall [(3a)] of [the] said casing [(3)] of [the] said engine [(M)], the electromagnetic retarder [(1)] being housed in a space delimited by [the] said flange [(20)], [the] said fixing arms [(24)] and [the] said frontal wall [(3a)] of [the] said engine [(3)].

8. (Twice Amended) The retarder as claimed in [any] either of claims 1 [to 7] and 2, wherein a pulley [(6)] situated at [the] an output of [the engine shaft] said crankshaft is arranged between [the] said casing [(3)] of [the] said engine [(M)] and the retarder [(1)].

9. (Twice Amended) The retarder as claimed in claim [8] 1, [as associated with claim 2, wherein the flange (11) of said external component (2) incorporates the pulley (6)] wherein said rotor part has an external component of substantially cylindrical shape surrounding said stator part and constituting said armature of the retarder, said external component having a radial flange secured to said crankshft, wherein said flange being pierced with a number of holes; said retarder further comprises a pulley being situated at an output of said crankshaft and arranged between said casing of said vehicle engine and said retarder, wherein said flange of said external component incorporates the pulley.

10. (Twice Amended) The retarder as claimed in [any] either of claims 1 [to 9] and 2, wherein said induction winding [(5; 5')] is energized from an electrical source, which is regulated for power, of the vehicle.